News release

Royal Navy benefits from new Met Office ocean forecast tool

13 May 2002

Royal Navy operations are now benefiting from high-resolution numerical ocean forecasts supplied by the Met Office. Like the more familiar weather forecasts, these ocean forecasts are based on numerical models initialised using measurements collected from a wide range of satellite and in situ platforms.

The ocean forecasts, however, predict the temperatures and currents below the surface of the ocean down to depths of several thousand metres. The Navy needs an accurate picture of temperature variations in the ocean in order to make better use of their sonar and gain a tactical advantage from accurate simulations of strong small-scale current systems.

To respond rapidly to the Navy's needs for high-resolution forecasts in new theatres of operation, a system has been developed to set up a series of 'nested' models of progressively increasing resolution and spin them up to real time quickly. Key to this system is a new set of software tools that enable the bathymetry and initial temperatures and salinities for the models to be set up quickly and reliably.

The Met Office recognises that innovation is a key element in its future success and awarded the designer of these tools, Dave Storkey, an Ocean Model Scientist at the Met Office, a prize for the most innovative improvement to operational systems. The award was presented at a ceremony on 6 March 2002 by Commander Mark Windsor on behalf of the Royal Navy.
Dave Storkey said: "The work on our ocean forecasting system is a team effort. We are all delighted that the Royal Navy are making good use of our forecasts. It's very satisfying that the software we have developed is helping us to set up new models so rapidly and I'm thrilled that our work was recognised at the innovation awards."

For further information:
Met Office Press Office +44 (0)1392 886655

Met Office Customer Centre 0870 900 0100
If you're outside the UK +44 (0)1392 885680

PRINTABLE VERSION

About
Met Office
Hadley Centre
Terms and conditions
Advertise on our site

News
News release archive
Media Centre

Learn
About the weather
From the bookshelf

Services

Mobile text forecasts
Weathercall
Marinecall
Mountain weather
MetWEB
Talk to a forecaster

Links
Met Office data users
National met. services
Scientific interest sites
EA Floodline
Directgov
Freedom of Information

Contact
Contact us
Questions answered

© Crown copyright